

Solutions of the Von Kàrmàn equations via the non-variational Galerkin-B-spline approach

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Abstract

This paper deals with the non-variational Galerkin-B-spline method recently developed by the authors. It is applied to circular thin flexible plates within the context of Von Kàrmàn equations. Our main result shows that the low orders of approximation have been sufficient to build the solutions from the basis functions in a high quality. Comparison of solutions obtained to variational approach with known ones is performed..

Keywords : B-spline; Variational; Galerkin; Kàrmàn equation.

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